Dorking and Horley Rural District Council

ANNUAL REPORT

OF THE

Medical Officer of Health

For the Year 1945



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WEST HILL HOUSE,
WEST HILL,
EPSOM.

December, 1946.

To the Chairman and Members of the

Dorking and Horley Rural District Council.

LADIES AND GENTLEMEN,

I have the honour to submit my Annual Report for the year 1945, which has been prepared in accordance with the Ministry of Health Circular 28/46.

With the exception of those relating to tuberculosis, the vital statistics for the year are satisfactory. Figures for tuberculosis show an increased incidence and mortality, a matter which I have discussed briefly in the text.

I take this opportunity of recording my appreciation of the cooperation and assistance received from all other officers of the Council engaged in public health work, and for the courtesy which the Council has extended to me.

I am,

Ladies and Gentlemen,

Your obedient Servant,

CYRUS IVE,
Medical Officer of Health,

Dorking and Horley Rural District

STAFF OF THE PUBLIC HEALTH DEPARTMENT.

Medical Officer of Health:

CYRUS IVE, M.B., B.S.(Lond.), M.R.C.S.(Eng.), L.R.C.P.(Lond.), D.P.H.

Assistant Medical Officer of Health (to 30.6.46):

A. H. GERRARD, M.D., M.R.C.P., M.R.C.S., D.P.H.

Surveyor and Chief Sanitary Inspector:

F. E. TRAVISS, M.R.San.I.

Sanitary Inspectors:

†G. SAWYER, A.M. Inst.M. & Cy.E., A.R.San.I.
T. H. LEE, A.R.San.I.
*E. A. ATKINSON, M.R.San.I., M.S.I.A.

Medical Officer of Health's Clerical Staff:

Senior Clerk: C. H. Argent. (Temporary.) Shorthand Typist: Miss N. Hearn. (Temporary.)

Chief Sanitary Inspector's Clerical Staff:

Mrs. M. Snelling. Mrs. A. Brown.

(The Medical Officer of Health and his Clerical Assistants act in a similar capacity for the Borough of Epsom and Ewell, and the Dorking and Leatherhead Urban Districts.)

[†] Also Deputy Surveyor.

^{*} Holds the Royal Sanitary Institute Certificate as Inspector of Meat and Other Foods, also in Sanitary Science applied to Public Buildings and Works.

TABLE I.—COMPARATIVE BIRTH-RATES, CIVILIAN DEATH-RATES, ANALYSIS OF MORTALITY, MATERNAL MORTALITY AND CASE RATES FOR CERTAIN INFECTIOUS DISEASES IN THE YEAR 1945:—

								England and Wales.	Dorking & Horley R.D.C.
Rates	per	1,000 (Civilian	Popu	lation.				
Births—									
Live Births Still Births		•••	•••		• • •			16.1 0.46	15.83 0.32
Deaths-									
All Causes Typhoid and P Scarlet Fever				•••	•••			11.4 0.00 0.00 0.02	11.87 0.00 0.00 0.00
Whooping Cou Diphtheria			•••					0.02 0.02 0.08	0.00
Influenza Smallpox Measles			•••					0.00 0.00 0.02	0.00
Notifications—	•••	•••	•••	•••	•••				
Typhoid Fever Paratyphoid Fo Cerebro-spinal Scarlet Fever Whooping Cou Diphtheria Erysipelas Smallpox Measles Pneumonia	ever Feve							0.01 0.01 0.05 1.89 1.64 0.46 0.25 0.00 11.67 0.87	0.00 0.00 0.00 0.89 1.17 0.05 0.23 0.00 23.89 0.23
		 per 1 N	 00 Live			•••		0.01	
DEATHS under 1 ye	ear o	f age				 rs of a	ge	46 5.6	35.3 5.9
Rates per	1,000	Total	Births	(Live	and St	ill).			
Maternal Morta Puerperal and Other Materna	Post	Aborti	ve Seps 	is		•••		0.49 1.22	0.00
Notifications— Puerperal Pyre	exia	•••					•••	9.93	0.00

Dorking and Horley Rural District

Annual Report of the Medical Officer of Health for the year 1945.

STATISTICS AND SOCIAL CONDITIONS OF THE AREA.

Area (acres)	• • •		53,178
Population (Census 1931)			18,485
Population (estimated mid-year 1945)			21,480
Number of inhabited houses according to Books at 31st December, 1945	the	Rate	6,644
Rateable value at 31st December, 1945			£212,733
Sum represented by a Penny Rate			£845

The Rural District consists of a rectangular-shaped area of approximately 85 square miles and is comprised of the Parishes of Abinger, Betchworth, Buckland, Capel, Charlwood, Headley, Holmwood, Horley, Leigh, Newdigate, Ockley and Wotton. With the exception of the whole of the Parish of Headley and the northern extremity of the Parish of Wotton, which lie to the north of the crest of the North Downs, the district is situated between the escarpment of the Downs and the northern boundary of the County of Sussex. In addition to the projection northwards caused by the situation of Headley Parish, further irregularities are produced on the northern boundary of the district by large indentations made by the Borough of Reigate and the Urban District of Dorking.

From north to south the geological nature of the ground changes from chalk to greensands, while the southern half of the district is clay. There is an associated variety of scenery and vegetation. The River Mole and its tributaries drain the greater part of the area; of the remainder the Tillingbourne stream rises in Wotton Parish and traverses the northern half of Abinger Parish. The River North drains the south-west fringes of the district as it flows south to join the River Arun.

Parish.		Area (Acres).	Census Population. 1931.	No. of Inhab- ited houses 31st Dec. 1945.	Rateable Value at 31st Dec. 1945.
Betchworth Buckland Capel Charlwood Headley Holmwood Horley Leigh Newdigate Ockley		7,481 2,562 1,362 5,694 6,901 1,640 3,749 7,449 3,419 4,744 3,400 5,317	1,544 1,046 473 1,782 2,284 487 891 7,137 518 886 703 734	531 426 159 632 725 127 254 2,818 204 332 239 197	£ 16,719 13,042 7,575 17,455 27,417 5,879 9,617 87,647 6,225 8,561 6,610 5,986
Totals	*****	53,718	18,485	6,644	212,733

EXTRACTS FROM VITAL STATISTICS FOR THE YEAR.

	Total	M.	F.		
Live Births:					
Total live births	340	173	167		per
Legitimate	310	155	155 }		
Illegitimate)	Population	19.85
Still Births:—					
Total still births	7	3		Birth Rate	per
Legitimate	5	2	3 }	1,000 Live	and
Illegitimate	2	1	1)	Still Births	20.17
Deaths (net)	255	127	128	Crude Dea Rate	
Deaths of Infants unde 1 year of age:—	r				
Total infant					
deaths	12	6	6		
Legitimate	11	6	5		
Illegitimate	1	_	1		
Death Rate of all infan	its per 1,	000 live birt	hs	•••	35.3
Death Rate of legitim	ate infan	nts per 1,00	0 legiti	mate live	0 = =
births					35.5
Death Rate of illegiting	ate infar	nts per 1,000) illegiti	imate live	00.0
births				***	33,3

Deaths from Puerperal Causes: -

Deaths from Fuerperal Causes.—	Deaths.	R	ate per 1,000 otal (live and still) births.
Puerperal and Post Abortive Sepsis	Nil		0.00
Other Maternal Causes	Nil		0.00
Deaths from:—			
Measles (all ages)			
Whooping Cough (all ages)			
Diarrhoea (under 2 years of age)			2
Cancer (all ages)			37

Table I shows a comparison of the vital statistics of the year for the district with those for England and Wales.

Table II shows a comparison of birth, death and infant mortality rates for the district since 1933 with figures for England and Wales during the same period.

TABLE II.—COMPARATIVE BIRTH, DEATH AND INFANT MORTALITY RATES. (1933—1945.)

Period	Annual Birt 1,000 liv		Rates per 1	rude Death ,000 civilian lation.	Annual Death Rates of Children under 1 year of age per 1,000 Live Births.		
1 (2100)	England and Wales	Dorking and Horley	England and Wales	Dorking and Horley	England and Wales	Dorking and Horley	
1933	14.4	13.4	12.3	12.2	64	25.9	
1934	14.8	14.7	11.8	12.2	59	66.2	
1935	14.7	14.2	11.7	11.3	57	32.9	
1936	14.8	14.2	12.1	12.6	59	52.6	
1937	14.9	13.6	12.4	11.8	58	32.4	
1938	15.1	14.7	11.6	11.1	53	49.7	
1939	15.0	13.8	12.1	12.4	50	57.4	
1940	14.6	13.4	14.3	12.3	55	50.2	
1941	14.2	14.1	12.9	11.9	59	46.0	
1942	15.8	18.5	11.6	12.9	49	55.1	
1943	16.5	17.5	12.1	12.6	49	34.3	
1944	17.6	19.3	11.6	12.2	46	27.5	
1945	16.1	15.8	11.4	11.9	46	35.3	

BIRTHS.

The total births accredited to the area by the Registrar-General were 340, of which 173 were of males and 167 of females, representing a birth rate of 15.8 per 1,000 of the civilian population, compared with the rate of 16.1 for England and Wales. Reference to Table II shows a considerable fall in the birth rate compared with the previous year, when it was the highest since the district was formed.

Seven still-births were registered during the year, giving a still-birth rate of 0.32, compared with the rate of 0.46 per thousand population for England and Wales.

DEATHS.

The deaths accredited to the area, after correction for the inward transfer of Dorking and Horley residents dying outside the district and the outward transfer of non-residents, were 127 males and 128 females, a total of 255. This represents a crude death rate of 11.9 per thousand of the estimated civilian population, compared with the rate of 11.4 for England and Wales as a whole.

The causes of death are set out in Table III.

TABLE III.—CAUSES OF DEATH IN THE DORKING AND HORLEY RURAL DISTRICT.

	Cause of Death.			M.	F.	Total.
1.	Typhoid and Paratyphoid Fevers	•••••		_	_	_
2.	Cerebro-spinal Fever	*****		_	-	_
3.	Scarlet Fever			_	-	_
4.	Whooping Cough	******		_	_	_
5.	Diphtheria	*****		_	_	_
6.	Tuberculosis of Respiratory System	*****		8	4	12
7.	Other forms of Tuberculosis	******		3	- 1	3
8.	Syphilitic Disease				_	
9.	Influenza		411111	_	_	
10.	Measles	******		_	_	_
11.	Acute Poliomyelitis and Polioenceph	alitis		_		_
12.	Acute Infectious Encephalitis			_	_	_
13.	Cancer of Buccal Cavity and Oesoph	nagus (n	nales)	2	_	$\frac{2}{2}$
13A.	Cancer of Uterus (females)		*****	_	2	2
14.	Cancer of Stomach and Duodenum	******		4	4	8
15.	Cancer of Breast	*****		_	9	9
16.	Cancer of all other sites		****	6	10	16
17.	Diabetes		*****	1		1
18.	Intra-cranial Vascular Lesions	*****	*****	12	16	28
19.	Heart Disease	*****		42	34	76
20.	Other Diseases of the Circulatory Sy	stem		5	5	10
21.	Bronchitis	******		3	8	11
22.	Pneumonia	******		5	7	12
23.	Other Respiratory Diseases			2	1	3
24.	Ulceration of the Stomach or Duode	enum		1	1	2
25.	Diarrhoea (under 2 years of age)			1	1	2
26.	Appendicitis	*****		_		_
27.	Other Digestive Diseases			1	3	4
28.	Nephritis	*****	*****	4	2	6
29.	Puerperal and Post-Abortive Sepsis	******		_	_	_
30.	Other Maternal Causes			_	_	_
31.	Premature Birth			2	1	3
32.	Congenital Malformation, Birth Inju	ury, Inf	antile			_
02.	Disease	*****		2	3	5
33.	Suicide			4	1 -	4
34.	Road Traffic Accidents	*****		· —	_	
35.	Other Violent Causes			3	1	4
36.	All Other Causes —			16	16	32
00.					100	055
				127	128	255
		-				

Reference to Table II shows that in spite of the strain of the war years the death rate has remained at a fairly steady level.

It will be noticed that on several occasions the local crude death rate has been higher than that for England and Wales, and that such is the case for 1945. Although recent reliable figures are not available, there having been no Census since 1931, it can be assumed that a larger proportion of the local population is to be found in the higher age groups than occurs when considering the population of the whole country. Naturally a higher mortality is to be expected among the older age groups, and if a correction for age were made, the local death rates would probably be substantially lower than those for England and Wales.

INFANT MORTALITY.

The deaths of infants under one year of age number 12. The infant mortality rate is 35.3 per thousand live births. This, although higher than the very low figure of the previous year, is still considerably lower than the rate of 46 for England and Wales. Eight of the deaths occurred within two days of birth; of these prematurity was a factor in 4, congenital malformation in 1, and conditions associated with delivery 3. The 4 remaining deaths occurred in children aged between 4 and 7 months, two being due to gastro-enteritis, 1 to pneumonia, and 1 the result of burns.

Reference to Table II shows a tendency in the last three years for the infant mortality rate to fall to a lower level than it reached in the pre-war period.

GENERAL PROVISION OF HEALTH SERVICES FOR THE AREA.

LABORATORY FACILITIES.

Specimens taken by medical practitioners for bacterial examination in connection with the diagnosis of infectious disease are sent to Dr. L. P. Chamberlain, pathologist to the East Surrey Hospital. A few specimens for the west side of the district have been examined at the Royal Surrey County Hospital, Guildford.

During the year the number of examinations made was as follows:-

For	the	diagnosis	of	Diphtheria			53
,,	,,	,,	,,	Haemolytic Stre	eptococ	cal	
					infec	tions	25
,,	,,	,,		Tuberculosis			11
,,	,,	,,	,,	Enteric Fever	• • •		2
							91

Laboratory examinations required to establish the diagnosis of suspected venereal disease in a communicable stage are arranged for under the Surrey County Council's Venereal Diseases Scheme.

AMBULANCE FACILITIES.

(1) INFECTIOUS DISEASES.—The Reigate Joint Isolation Hospital Board maintains an ambulance for the removal of cases of infectious disease. (Tel. No. Redhill 115.)

(2) Non-Infectious and Accident Cases.—By agreement with the Dorking Urban District Council the western part of the district is covered by that Council's ambulance service. The ambulances are garaged at the Fire Station, Dorking. (Tel. No. Dorking 2222.)

The Parish of Headley is provided for by a similar arrangement with the Leatherhead Urban District Council. (Tel. No. Leatherhead 2266.)

The Horley Division of the St. John Ambulance Brigade maintains two ambulances for use in the eastern part of the district.

For the parishes of Leigh, Buckland and Betchworth, which adjoin the Borough of Reigate, the services of the ambulance maintained by the Reigate Division of St. John Ambulance Brigade can be obtained. (Tel. No. Reigate 2579.)

NURSING IN THE HOME.

(a) GENERAL AND MATERNITY NURSING AND MIDWIFERY.—The following Nursing Associations carry out work within the district:

The Abinger and Wotton, the Betchworth and Leigh, the Capel and Newdigate, the Charlwood, the Dorking and District, the Holmwood, the Horley and Burstow, the Oakwood Hill, Forest Green and Ockley, the Salfords, and the Walton and Headley.

(b) Nursing of Cases of Infectious Diseases.—There is no special provision for the nursing of such cases.

CLINICS AND TREATMENT CENTRES.

- (a) MATERNITY, CHILD WELFARE AND TUBERCULOSIS.—The County Council is the responsible authority for these services. A list of County Council Health Centres and Voluntary Health Centres is set out below.
- (b) DIPHTHERIA IMMUNISATION.—Clinics for immunisation against diphtheria are held by the Medical Officer of Health at the Dene Street Clinic, Dorking, and at the Welfare Centre, Station Road, Horley. Treatment is also available at all Infant Welfare Centres.
- (c) Scables Treatment.—To meet the increased incidence of scables which has occurred during the war in this district, in common with the whole country, a treatment centre was established at the First Aid Post at Horley. On cessation of hostilities this treatment centre was closed. Treatment is now available at the out-patient departments of the Redhill and of the Dorking County Hospitals.

The total number of patients attending these clinics during the year

was 96.

(d) VENEREAL DISEASES.—The Surrey County Council is the authority responsible for the administration of matters dealing with the prevention, diagnosis and treatment of venereal diseases.

TIME-TABLE OF CLINICS.

MATERNITY AND C	HILD	WELFARE CENTRES.	
		Centres Available.	Time Held.
Abinger	•••	Ewhurst Village Hall Ockley Village Hall Peaslake Old School Room	1st and 3rd Fridays, 2 p.m. 1st and 3rd Fridays, 2 p.m. 2nd and 4th Mondays, 2 p.m.
		Dorking Clinic, Dene Street, Dorking	Wednesdays at 2 p.m.; 1st, 3rd and 5th Mondays at 2 p.m.
Betchworth and Buck	land	Village Hall, Brockham	1st and 3rd Fridays, 2 p.m.
		(Voluntary) The Vicarage, Betchworth (Voluntary)	3rd Tuesdays, 2 p.m.
Capel		Wesley Hall, Capel	2nd and 4th Thursdays,
		Village Hall, Ockley	2 p.m. 1st and 3rd Fridays.
Charlwood	•••	Parish Hall, Charlwood.	2nd and 4th Wednesdays,
		Health Centre, Horley	2 p.m. Every Friday, 2 p.m.
Headley	•••	Leatherhead Institute Walton-on-the-Hill Congregational School Room	Every Friday, 2 p.m. 1st and 3rd Tuesdays, 2 p.m.
Holmwood		Wesley Hall, Capel	2nd and 4th Thursdays,
		Dene Street Clinic, Dorking	2 p.m. Wednesdays at 2 p.m.; 1st, 3rd and 5th Mondays at 2 p.m.
		Village Hall, Ockley	1st and 3rd Fridays, 2 p.m.
Horley	•••	Health Centre, Horley The Parish Hall, Salfords	Every Friday, 2 p.m. 2nd and 4th Tuesdays, 2 p.m.
Leigh		Health Centre, Leigh (Voluntary)	2nd and 4th Mondays, 2 p.m.
Newdigate		Village Hall, Newdigate	3rd Tuesday, 2 p.m.
Ockley	•••	Village Hall, Ockley	1st and 3rd Fridays.
Wotton	•••	Dene Street Clinic, Dorking	Every Monday and Tuesday, 2 p.m.

DIPHTHERIA IMMUNISATION.

Diffill Immenioni	1011.	
	Centres Available.	Time Held.
Horley and adjacent area	(a) Health Centre, Horley	1st Thursday, 10 a.m.
Area adjacent to Dorking	(b) Dene Street Clinic, Dorking	1st Wednesday, 10 a.m.
Other parts of the District	(c) At any Infant Welfare Clinic other than at Horley and Dorking	
ANTE-NATAL CLINICS.		
	Centres Available.	Time Held.
Area adjacent to Dorking	Dorking County Hospital	Fridays at 9.30 a.m.
Area adjacent to Horley	Welfare Centres, Station Road, Horley	Fridays at 9.30 a.m.
Area adjacent to Redhill and Reigate	Redhill County Hospital	Fridays at 1.30 p.m.
Parish of Headley	Leatherhead Clinic, The Institute, Leatherhead and	Fridays at 9.30 a.m.
	The Epsom County Hospital, Dorking Road, Epsom	Mondays and Thursdays at 1.30 p.m.
Tuberculosis Clinics.		
	Centres Available.	Time Held.
Abinger	Dene Street Clinic, Dorking	1st and 3rd Thursdays at 10 a.m.
Buckland	Dene Street Clinic or 1a,	Thursdays at 2 p.m., and
Betchworth	Cecil Road, Redhill	the first Thursday also
Newdigate		at 5.30 p.m.
Capel	Dene Street Clinic,	1st and 3rd Thursdays at
Ockley Holmwood	Dorking	10 a.m.
Wotton		
Headley	The Health Centre, 44, Waterloo Road, Epsom	Thursdays at 2 p.m., and 3rd Thursday at 5.30 p.m.
Charlwood Horley	Health Centre, Station Road, Horley, or 1a,	2nd Wednesday at 10 a.m. in each month.
Leigh	Cecil Road, Redhill	

SCABIES TREATMENT CLINICS.

Centres Available.

Time Held.

Area adjacent to Dorking

Out-patients' Dept., Dorking County Hospital ...

Mondays and Thursdays at 1.30 p.m.

Area adjacent to Redhill...

Out-patients' Dept., Redhill County Hospital By appointment.

HOSPITAL ACCOMMODATION.

(a) GENERAL AND MATERNITY.—The Horley District Cottage Hospital, of 11 beds, is the only general hospital situated in the District.

The Redhill County Hospital and the East Surrey Hospital take in patients from the eastern parishes who are in need of medical or surgical treatment. The Redhill County Hospital maintains a maternity department.

The Dorking County Hospital and the Dorking and District Hospital provide accommodation for residents in the western parishes requiring medical or surgical treatment. The Dorking County Hospital has a maternity department.

(b) INFECTIOUS DISEASES.—The Rural District is a constituent member of the Reigate Joint Isolation Hospital Board, which maintains a hospital of forty-five beds at Whitebushes, Redhill.

SANITARY CIRCUMSTANCES OF THE AREA, HOUSING & SUPERVISION OF FOOD.

WATER.

Three companies supply water to the various parts of the District. The area covered by the East Surrey Water Company, a statutory undertaking, includes the Parishes of Betchworth, Buckland, Charlwood, Headley, Horley, Leigh and Newdigate. In these parishes there are only a few isolated premises which do not have the benefit of a piped main water supply.

The East Surrey Water Company obtains most of its water from deep wells in the chalk of the North Downs. The water is softened and chlorinated before distribution. The results of typical analyses of samples taken in the district are as follows.

EAST SURREY WATER COMPANY.

CHEMICAL RESULTS IN PARTS PER 100,000.

Appearance: Bright—very slight film	Metals	Absent
deposit of mineral debris consisting	" Free Chlorine reaction "	0.25
of chalk particles.	1	part per
Turbidity: Less than 5 parts per		million
million, Silica Scale.	Odour	Nil
Colour Normal	Free Carbonic Acid	Absent
Reaction pH—Alkaline 9.0	Total Solids, dried at 180°C	16.0
Electric Conductivity at 20°C. 240	Alkalinity as Calcium	
Chlorine in Chlorides 2.0	Carbonate	4.5
Hardness: Total 8.5	Temporary 2.5 Permanent	6.0
Nitrogen in Nitrates 0.48	Nitrogen in Nitrites	Absent
Free Ammonia 0.010	Ammoniacal Nitrogen	_
Albuminoid Ammonia 0.0000	Albuminoid Nitrogen	_
Oxygen absorbed in 4 hours at		
27°C 0.005		

BACTERIOLOGICAL RESULTS.

(Bacteriological sample dechlorinated on collection.)

Number of "	Bacteria	" growin	g on A	lgar	per	c.c.	or	ml.	in	1 day	at	37°C.		0
,,	19	,,		,,	per	c.c.	or	ml.	in 2	days	at	3 7 °C.		0
,,	,,	*1		17	pier	c.c.	or	ml.	in 3	days	at	20°C.		0
Presumptive	Coliform	Reaction		Pr	reser	nt in		_	-	Abs	ent	in	100	c.c.
Bact Coli					,,	,,		-	-	,,		,,	100	c.c.
Cl. Welchii	Reaction				, ,			_	-	,,		,,	100	c.c.

The Dorking Water Company is a statutory water undertaking distributing water to the Parishes of Capel, Holmwood and Ockley. In this area there are a number of premises which, owing to their isolated position, have not so far been provided with a piped main water supply. There is also a community of some size at Coldharbour which is without this amenity, where increasing difficulty has been experienced in spells of dry weather in obtaining adequate supplies from the local springs. The Council is promoting a scheme to bring the company's water to the village, the height of which will require the installation of pumping machinery and the construction of a service reservoir.

The Dorking Water Company obtains its water from a series of fifteen wells situated a little to the south of the Pippbrook stream shortly before it reaches the western outskirts of Dorking. The boreholes extend to a depth of 150 feet into the Folkestone beds, from which the water is siphoned to a reservoir situated at the works. After chlorination it is pumped to covered service reservoirs.

DORKING WATER COMPANY.

CHEMICAL RESULTS IN PARTS PER 100,000.

Appearance: Bright with very few	Oxygen absorbed in 4 hours at	0.005
Particles of mineral debris.	27°C	
Turbidity: Less than 5 parts per	Metals	
turbidity: Bess than a pro-	" Free Chlorine reaction "	Absent
million, Silica Scale.	Odour	
Colour Normal	Free Carbonic Acid	2.9
Reaction pH-On the acid	Free Carbonic Acid	22.0
side of neutrality 6.7	Total Solids, dried at 180°C	22.0
Electric Conductivity at 20°C. 325	Alkalinity as Calcium	
Ct. 1 - 1 - Chloridge 18	Carbonate	10.0
Chlorine in Chlorides 1.8	Temporary 8.0 Permanent	7.0
Hardness: Total 15.0	Nitrites	
Nitrogen in Nitrates 0.56	Nitrites	Absent
Free Ammonia 0.0000	Ammoniacal Nitrogen	
Albuminoid Ammonia 0.0011	Albuminoid Nitrogen	

BACTERIOLOGICAL RESULTS.

Number of "Bacteria	" growin	g on	Agar per	c.c.	or ml. in 1 or ml. in 2	day at	37°C.	0
,, ,,	,,		per	c.c. c	or ml. in 3	days at	20°C.	2
The Bacillus Coli			Prese	nt in	_	Absent	in	100 c.c.
Presumptive Coliform Cl. Welchii Reaction			"	,,		"		100 c.c.

The Hurtwood Water Company has mains in the Parish of Abinger and for a short distance in the Parish of Wotton, though a considerable part of this area remains dependent on wells, springs or piped supplies from private water undertakings. At Abinger Hammer there is a closely built up hamlet, for which an extension of a main water supply is most desirable.

The Hurtwood Water Company obtains its supplies from deep boreholes in the greensand and has its works in the Guildford Rural District.

An analysis of a sample taken from the Hurtwood Company's supply gives the following results.

CHEMICAL RESULTS IN PARTS PER 100,000.

Appearance: Bright with very few	Metals—Iron Other metals absent.	0.010
particles of mineral debris.		Nil
Turbidity: Less than 5 parts per	Odour	
million, Silica Scale.	Free Carbonic Acid	
Colour Normal	Total Solids, dried at 180°C.	21.0
Reaction pH—Neutral 7.2	Alkalinity as Calcium	
Electric Conductivity at 20°C. 310	Carbonate	11.0
Electric Conductivity at 25		6.0
Chlorine in Chlorides 1.6	Temporary 9.0 Permanent	
Hardness: Total 15.0	Nitrites	Absent
Nitrogen in Nitrates 0.36	Ammoniacal Nitrogen	_
Tittlogen in Tittlates	Albuminoid Nitrogen	
1100 1111111101110	mountained trial egen to	
Albuminoid Ammonia 0.0000		
Oxygen absorbed in 4 hours at		
27°C 0.005		
21 0 0.000		

BACTERIOLOGICAL RESULTS.

Number of "Bacteria	" growing or				
,,	,,	,, per c.c. or	r ml. in 2	days at 37°C.	3
,,	,,	,, per c.c. or	r ml. in 3	days at 20°C.	28
Presumptive Coliform	Reaction	Present in	_	Absent from	100 c.c.
Bact. Coli		11 11	_	11 11	100 c.c.
Cl. Welchii Reaction		,, ,,		11 11	100 c.c.

It is estimated that of the 6,644 inhabited premises in the district, approximately 6,400 have a piped water supply direct into the houses, 69 have a piped supply by means of external standpipe, and approximately 175 are dependent on well water or rainwater. Many of the latter group are situated in isolated surroundings for which the provision of an alternative supply, even if desirable, would be impossible. As regards the remainder of the group, several schemes have been prepared for consideration by the Council for possible action under the Rural Water Supplies Act.

Measures taken during the year to improve unsatisfactory supplies have included the sampling of the water from 10 wells supplying private premises, all of which were found to be unsatisfactory for drinking purposes. Information of results was given to the owners, and in 6 cases a remedy was possible by connecting with a main supply. Where no such alternative was possible, tenants were advised as to the precautions to be taken.

DRAINAGE AND SEWERAGE.

The following parishes have been sewered:

- Betchworth.—A gravitational system to a Pumping Station near junction of Wonham Lane and Betchworth Street, from whence electric pumps raise the sewage into Dorking U.D.C. sewers for treatment at their works.
- CAPEL.—Gravitational system to the treatment works between Vicarage Lane and Misbrooks Green. Part of the sewage is treated by broad irrigation and part over sprinkler filter bed. The works are equipped with an electric three-phase motor and starter and a Gwynne Centrifugal Pump.
- CHARLWOOD.—Only a very small portion of this parish is sewered, and the sewage gravitates to a small broad irrigation area.

An extensive drainage scheme for the whole of the Parish was in preparation by the Council's consultant engineers, Messrs. Kershaw and Kauffman, at the end of the year.

- HOLMWOOD.—A gravitational system of sewerage to settlement tanks, and broad irrigation treatment.
- HORLEY.—An extensive system of sewage disposal is now in operation. The Salfords area gravitates to a separate pumping station, whence the sewage is pumped to the Horley Works. The works are modern and include electric pumping plant, percolating filters, settling tanks, and sludge drying beds.
- Ockley.—Is served by two small disposal plants which comprise settling tanks and filter beds.

CESSPOOLS.

The Council now maintain a fleet of 5 Dennis Cesspool Emptiers, and by resolution have agreed to empty each cesspool 6 times a year free of charge. For each emptying in excess of six, a charge of 10s. per load is made.

REFUSE COLLECTION AND DISPOSAL.

Domestic refuse is collected as follows-

PARISHES.

BETCHWORTH, BUCKLAND, CAPEL.

A monthly collection by private contractor and disposal by incineration and tipping in the Borough of Reigate.

CHARLWOOD.

A monthly collection by direct labour, and disposal in the Borough of Reigate.

HOLMWOOD.

A weekly collection and disposal in the Borough of Reigate.

HORLEY.

A weekly collection by direct labour, and disposal in Borough of Reigate.

HEADLEY, OCKLEY, ABINGER, NEWDIGATE, LEIGH, WOTTON.

A monthly collection by private contractor and disposal by incineration and tipping in the Borough of Reigate.

SANITARY INSPECTION OF THE AREA.

I am indebted to Mr. F. E. Traviss, Surveyor and Chief Sanitary Inspector, and to Mr. E. A. Atkinson, Housing Inspector, for the following information relating to visits to premises for the purpose of inspection under the Public Health and Housing Acts.

HOUSING ACTS:

Complete inspection (other than premises is	nspecteo	i under	Hobh	ouse 5	urvey)	• • •	20				
Houses inspected under Hobhouse Survey		• • •			•••	•••	1293				
Number of informal notices served			• • •	•••	•••	•••	32				
Number complied with	•••	•••	•••	•••	• • •	•••	24				
PUBLIC HEALTH ACTS:											
Dwelling-houses				•••		• • •	16				
Tents, Vans and Sheds				•••	• • •	•••	1				
Visits re infectious disease				•••	•••	•••	16				
Number of water samples taken for bacte	riologic	al exar	ninatio	n	•••	•••	18				
Visits re drainage and nuisance from cess	pools	•••		•••	• • •	•••	12				
FOO	DD:										
Inspections of food shops-e.g., butchers,	bakehoi	ises, et	c.			• • •	26				
Visits re unsound food		•••	•••		•••	•••	127				
FACTORIES, WORKSHOPS & WORKPLACES:											
Number of premises on Register			•••	•••	•••	• • •	147				
Number of visits				• • •	•••	• • •	86				
Defects found and remedied: Insufficient s	anitary	accom	modati	on	•••		2				

SURVEY OF RURAL HOUSING

The Council have accepted the recommendation of the Rural Housing Sub-Committee of the Central Housing Advisory Committee that a survey of all lower rated dwelling-houses should be made, and that all property inspected should be placed in its appropriate place in the following five categories. A staff of four assistants was engaged, and commenced work under the supervision of the Housing Inspector in April. Details of their work to the end of the year are as follows—

Category 1 (Fit in all respects)				209
,, 2 (Minor defects)	•••	•••	• • •	682
,, 3 (Major defects) ,, 4 (Rural workers' dwellings)				263 15
,, 5 (Totally unfit dwellings)				
Not classified				
			1	,293

The survey has been completed in the Parishes of Charlwood, Holmwood, Leigh, Betchworth and Newdigate. The results have been embodied in a report for each Parish, and should be of great value when conditions allow attention to be paid to housing repair work. In the present stringent position of housing no early action can be foreseen with regard to houses placed in Category 5.

MILK AND DAIRIES.

At the end of the year there were 251 entries on the Register of Cowkeepers, Dairymen and Retailers of Milk.

Number of visits to cowsheds and dairies	 	246
Number of cowsheds paved and drained	 	2
Number of cowsheds limewashed after notice	 	6

ADULTERATION OF FOOD.

The County Council is the authority responsible for carrying out the sections of the Food and Drugs Act dealing with food adulteration. I have received the following information from the County Medical Officer of Health on work done in this connection in the district during the year:—

Seventy-seven samples of milk were taken, of which eleven were found on analysis to be adulterated or deteriorated: legal proceedings were taken in one case and a conviction obtained.

Thirteen samples of wine and spirits were analysed, of which eight were found to be adulterated. Proceedings were taken in three cases, and conviction obtained in each instance.

In addition, seven samples of various substances were analysed, one of which was found to be adulterated, but no legal action was taken.

PREVALENCE OF, AND CONTROL OVER, INFECTIOUS DISEASE.

NOTIFIABLE INFECTIOUS DISEASE.

Table IV shows the total of the various infectious diseases notified during 1945, classified according to age and sex, together with the number of cases removed to isolation hospital and the total deaths, if any, from each disease. Table V shows the incidence of notifiable infectious disease in the various parishes.

SMALLPOX.—No case of smallpox was notified during the year. No primary vaccination or re-vaccination was performed by the Medical Officer of Health under the Public Health (Smallpox Prevention) Regulations, 1917.

Scarlet Fever.—A considerable decrease occurred in the incidence of Scarlet Fever during the year, in which 19 notifications were received, compared with 48 in 1944. The case rate per 1,000 civilian population was 0.89, compared with the rate of 1.89 for England and Wales. The disease was of a mild character and there were no deaths. All cases were admitted to isolation hospital for treatment.

DIPHTHERIA.—One case of diphtheria was notified during the year. The patient was an adult male whose illness was of a very mild character. The case rate per 1,000 civilian population was 0.05, compared with the rate of 0.46 for England and Wales.

Two cases of suspected diphtheria were admitted to isolation hospital for observation. In neither case was the diagnosis confirmed.

TABLE IV.

Cases Notified.								s	ed to spital										
Diseas e		Under 1 yr.	1 to 3		3 to 5		A to 10	3	10 to 15	2	30 0 PE	3		tako nue ez		All ages	Total all ages both sexes	Cases admitted Isolation Hospi	Deaths
	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F		C	<u>—</u>
carlet Fever Yhooping Cough easles riphtheria neumonia rysipelas	7	1 9	2 5 49 —	6 34 —	3 2 42 - 1	4 44 —	3 4 131 —	4 3 123 — —	2 - 25 - - -	1 32 — —	5 - 1	1 -9 - -	- - 1 1	3 -3 -3 4	10 11 259 1 2 1	9 14 254 — 3 4	19 25 513 1 5 5	19 1 9 - 1 2	

TABLE V.

Disease		Abinger	Betchworth	Buckland	Capel	Charlwood	Headley	Horley	Leigh	Newdigate	Ockley	Wotton All Districts
Scarlet Fever	 	1	4	-	-	3	-	8	1	1	-	1 19
Diphtheria	 	-	-	-	-	_	_	1	-	_	-	
Pneumonia	 	_	1	1			1.	1		_	-	1 3
Erysipelas	 	-		_		1	_	4		_		- 3
Whooping Cough	 	2	4	-		1	_	15	1	1	-	1 2
Measles	 	27	49	5	18	33	23	260	6	70	20	2 51
		30	58	6	18	38	24	289	8	72	20	5 568

IMMUNISATION AGAINST DIPHTHERIA.

Progress has been made during the year with the Council's scheme for obtaining the immunisation of children against diphtheria. Regular clinics have been held at the Welfare Centre, Station Road, Horley, and the Dene Street Clinic, Dorking, and treatment has also been available as required at all other County Council Infant Welfare Centres. During the year 260 children received treatment.

Active immunisation against diphtheria has now been in operation in the district since 1936 and can claim a part in the reduction of the incidence and mortality rates which has occurred.

At the end of 1945, 914 children under the age of five years and 2,402 aged five to 15 years are known to have received treatment, equivalent to percentages of 50.5% and 76.7% respectively of the estimated child population in the two age groups. The ideal is for every child to receive a primary treatment of two injections at about the age of one year, with further single injections at school entry and from time to time during the school life. Even with such treatment it is not claimed that absolute immunisation will be attained by every child, but there is clear evidence that the risk of an untreated child contracting diphtheria is four times as great as that of an immunised child, and that the risk of death is nearly thirty times as great.

In Table VI are set out, for purposes of comparison, figures relating to the incidence of diphtheria and mortality rate, and the number of children known to have been immunised in each year since 1934.

TABLE VI—INCIDENCE OF DIPHTHERIA IN DORKING AND HORLEY RURAL DISTRICT.

Year.			No. of Cases Notified.	Incidence Rate per 1,000 Population.	No. of Deaths.	Mortality Rate per 1,000 Population.	No. of Children Immunised in each Year.
1934	•••		20	1.02	_	0.00	_
1935			5	0.25	_	0.00	_
1936			14	0.70	1	0.05	193
1937			13	0.64	3	0.15	168
1938			1	0.05	_	0.00	304
1939			1	0.05	_	0.00	268
1940			3	0.12	_	0.00	281
1941			3	0.12	_	0.00	961
1942		}	4	0.17	_	0.00	647
1943			_	0.00	_	0.00	625
1944			3	0.13	_	0.00	282
1945			1	0.05	_	0.00	260

PNEUMONIA.

Five cases of pneumonia were notified during the year, giving a case rate per 1,000 civilian population of 0.23, compared with 0.87 for England and Wales.

TUBERCULOSIS.

Thirty-one names were added to the tuberculosis register during the year, bringing the total on the register to 143. They included 23 of persons already domiciled in the district and eight of persons who came to live in the district from other areas in which they had already been notified. Nineteen of the notifications related to the pulmonary form of the disease and 12 to non-pulmonary.

Twelve deaths occurred from pulmonary tuberculosis, representing an annual death rate of 0.56 per thousand population, and three deaths were caused by non-pulmonary tuberculosis, with a death rate of 0.14. The tuberculosis death rate was 0.70, compared with a rate of 0.62 for England and Wales.

An analysis into types of disease and age groups of new cases and of those dying is to be found in Table VII. For comparative purposes, figures relating to the notification of and mortality from tuberculosis between the years 1938-45 are set out in Table VIII, the notification figures being those for persons domiciled in the district at the time of diagnosis of the disease. The figures show a serious deterioration from 1940 onwards. No doubt the cause for some of this can be found in the anxious and fatiguing conditions of the war, in the difficulty of maintaining an accustomed diet scale, particularly in regard to fats; and in overcrowd-

ing. The increased incidence rate may also reflect improved methods of diagnosis, especially the increase in the use of radiography. Regular medical supervision of service personnel and factory workers may also have had some effect. It is evident that energetic steps will need to be taken by all concerned to regain the ground which has been lost. So far as the Rural District Council is concerned, rehousing of families with a tuberculous member living in unsatisfactory circumstances will be a practical and important measure calculated to improve the chances of the individual patient, and, more important from a social aspect, to minimise further spread of infection from that particular source.

The Reigate Care Committee and the Dorking Care Committee both extend their important voluntary work to residents of the rural district.

Deaths Additions to Register Non-Pulmonary. Pulmonary. pulmonary. pulmonary. M. F. Age Period Under 1 1 to 5 to 10 10 to 15 1 1 15 to 20 1 20 to 25 3 25 to 35 1 35 to 45 ***** 1 2 1 45 to 55 1 55 to 65

TABLE VII.

TABLE VIII—TUBERCULOSIS INCIDENCE AND MORTALITY, 1938-1945.

8

4

1

5

1

8

4

3

2

14

65 and upwards

Totals

Year.	Population.	Total Primary Notifications.	Rate per 1,000 Population.	Total Deaths.	Death Rate per 1,000 Population.
1938 1939 1940 1941 1942 1943 1944	20,810 20,060 24,880 23,410 22,740 22,610	12 15 17 26 22 22 27 23	0.58 0.72 0.84 1.05 0.94 0.97 1.2 1.07	7 4 8 14 13 15 9	0.33 0.18 0.33 0.56 0.59 0.65 0.40 0.70